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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/696,813	10/30/2003	Cheng Chung Wang	10111394	1309

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EXAMINER

HEWITT, JAMES M

ART UNIT

PAPER NUMBER

3679

DATE MAILED: 10/20/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No. 10/696,813	Applicant(s) WANG, CHENG CHUNG	
	Examiner James M. Hewitt	Art Unit 3679	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 7/22/05 & 8/4/05.
2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-15 is/are pending in the application.
4a) Of the above claim(s) _____ is/are withdrawn from consideration.
5) ☐ Claim(s) _____ is/are allowed.
6) ☒ Claim(s) 1-15 is/are rejected.
7) ☐ Claim(s) _____ is/are objected to.
8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☒ The specification is objected to by the Examiner.
10) ☒ The drawing(s) filed on 30 October 2003 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|---|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date <u>8/4/05</u> . | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Drawings

The drawings are objected to as failing to comply with 37 CFR 1.84(p)(4) because reference character "4314" has been used to designate both spring and recess (refer to Figures 4C-4F). Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

Specification

The amendment filed 7/22/05 is objected to under 35 U.S.C. 132(a) because it introduces new matter into the disclosure. 35 U.S.C. 132(a) states that no amendment shall introduce new matter into the disclosure of the invention. The added material which is not supported by the original disclosure is as follows:

In the second paragraph added at page 2, line 1, the spring is said to be compressed by the bar to open the first valve or the second valve when the cam

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element is in the first orientation, and the bar is said to be pushed by the spring and received in the recess to close the first valve or the second valve. This is not supported by the original disclosure. The original disclosure encompasses a valve switch for opening/closing a first valve, and a second valve switch for opening/closing a second valve, not a single valve switch for controlling two valves.

Applicant is required to cancel the new matter in the reply to this Office Action.

The disclosure is objected to because of the following informalities:

On page 9 line 12, the spring is identified by reference numeral '4314' and on page 9 line 16, the recess is also identified by reference numeral '4314'.

Appropriate correction is required.

Claim Objections

Claims 6-7 are objected to because of the following informalities:

In claim 6 line 2, "an" should be "and".

Appropriate correction is required.

Claim Rejections - 35 USC § 112

The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

Claims 6-7 and 12-15 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention.

In claims 6-7 and 12-15, a single valve switch is described to open and close the first or the second valve via a cam element, a bar and a spring. This is not supported by the original disclosure. The original disclosure encompasses a valve switch for opening/closing a first valve, and a second valve switch for opening/closing a second valve, not a single valve switch for controlling two valves.

Claims 5-7 and 11-15 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the enablement requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to enable one skilled in the art to which it pertains, or with which it is most nearly connected, to make and/or use the invention.

It is unclear as to how a single valve switch would be used to selectively open the first valve or the second valve.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

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A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 1-3 are rejected under 35 U.S.C. 102(b) as being anticipated by Brown (US 5,806,115).

With respect to claim 1, Brown discloses an inflatable product, including: a first chamber (21); a first pack (22) having an air intake connected to the outside the first chamber and first outlet (30) connected to the inside the first chamber; a first valve for opening and closing the first outlet, wherein the first valve is received in the pack (refer to Figures 15-23); a fan and motor received in the pack, wherein air is pumped by the fan and motor from the outside of the first chamber through the air intake and the first valve and then into the first chamber from the first air outlet (refer to Figures 15-23 and col. 25, line 9 – col. 29, line 19).

With respect to claim 2, further including a second chamber (21), and the pack further having a second outlet (31) connected to the second air chamber so that the fan and motor pump air into the second chamber through the second air outlet.

With respect to claim 3, further including a second valve for opening and closing the second air outlet. Refer to Figures 15-23 and col. 25, line 9 – col. 29, line 19.

Claims 1 and 4 are rejected under 35 U.S.C. 102(b) as being anticipated by Aymar (US 3,606,623).

With respect to claim 1, Aymar discloses an inflatable product, including: a first chamber (one of the bladders); a first pack (22) having an air intake connected to the

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outside the first chamber and first outlet (28) connected to the inside the first chamber; a first valve (solenoid) for opening and closing the first outlet, wherein the first valve is received in the pack (see Figure 4); a fan and motor received in the pack (as should be understood), wherein air is pumped by the fan and motor from the outside of the first chamber through the air intake and the first valve and then into the first chamber from the first air outlet (Aymar should be understood to operate in this way).

With respect to claim 4, further including a second chamber (another bladder) and a two-way valve device connected between the first and second chamber so that the air in the first chamber flows into the second chamber through the two-way valve. Refer to column 4, lines 1-51.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1-3 and 8-11 are rejected under 35 U.S.C. 103(a) as being unpatentable over Hargin (US 388,037).

With respect to claims 1 and 8, Hargin discloses an inflatable product, including: a first chamber (E); a first pack (shown in its entirety in Figure 4) having an air intake (e') connected to the outside the first chamber and first outlet (g) connected to the inside the first chamber; a first valve (g') for manually opening and closing the first outlet,

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wherein the first valve is received in the pack (see Figure 4). Hargin fails to teach a fan and motor received in the pack for inflating air from the outside of the first chamber through the intake into the pack and then from the air outlet into the first chamber. Hargin instead uses the spring-actuated lid to inflate air from the outside of the first chamber through the intake into the pack and then from the air outlet into the first chamber. It would have been obvious to one having ordinary skill in the art at the time the invention was made to employ an electrical pump comprising a fan and a motor in place of the spring-actuated lid since it has been held to be within the general skill of a worker in the art to automate a manual activity. In addition, it should be understood that making such a modification is one of standard engineering knowledge and principle.

With respect to claims 2 and 9, further including a second chamber (E), the pack further having a second air outlet (g) connected the second chamber so that the fan and motor pump air into the second chamber through the second air outlet.

With respect to claims 3 and 10-11, further including a second valve (g') opening and closing the second air outlet. Hargin fails to teach a valve switch to selectively open the first valve or the second valve. As Applicant did not properly challenge the examiner's taking of official notice of the use a switch to selectively open a valve, such is taken as admitted prior art. And it would have been obvious to employ such a switch in order to selectively control the opening and closing of the valves (g').

Response to Arguments

Applicant's arguments filed 7/22/05 have been fully considered but they are not persuasive.

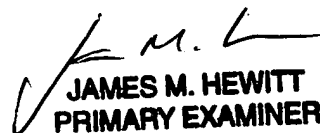
Applicant asserts that it would not have been obvious to replace the spring-actuated pump of Hargin with a fan and motor, stating that the principal operation of the device would be changed, and a complete redesign of the product would be required. The Examiner disagrees. It would have been well within the skill of the skilled artisan to employ an electrical pump comprising a fan and a motor in place of the spring-actuated manual pump. And this would not change the principal operation of the device. The device would still function as an air mattress; the difference would be that inflation and deflation would be made more efficient. This is the expectation/motivation for automating a manual activity. Regarding the assertion that the device would have to be completely redesigned, Applicant provides no specifics to support this claim. It should be understood that in automating a manual activity, some redesign would be necessary. The redesign required in this case is not considered to involve a complete redesign of the device, and would be well within the skill of the skilled artisan.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to James M. Hewitt whose telephone number is 571-272-7084.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Daniel Stodola can be reached on 571-272-7087. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).


JAMES M. HEWITT
PRIMARY EXAMINER